

Listing of Claims:

Claims 1 – 30 (**canceled**)

31. (**currently amended**) A method of forming a glass article having a first section and a second section, the first section adjacent the second section, the method comprising the steps of:

providing a gas mixture to a glass tube said gas mixture including a silica precursor;

first coating the inside of the glass tube to form the first section containing silica;
second coating the first section to form the second section containing silica
wherein the first section has a concentration of a first halogen and the second section has a concentration of a second halogen and wherein the first and second halogen comprise a different composition; and

processing the glass tube having the first and second sections to form the glass article wherein at least one of a partial pressure of the second halogen in the gas mixture and a temperature of the glass tube is configured to affect the concentration of the second halogen in the second section.

32. (**original**) The method of claim 31 further including configuring the temperature of the glass tube to be less during the second coating step than during the first coating step.

33. (**original**) The method of claim 32 wherein the configuring step includes configuring the temperature of the glass tube during the second coating step to be between about 100°C and 300°C less than during the first coating step.

34. (**original**) The method of claim 31 wherein the providing step includes providing the partial pressure of the second halogen during the second coating step in the range of 2-10 Torr.

35. **(original)** The method of claim 31 wherein the temperature of the glass tube is a temperature of an internal portion of the glass tube.

36. **(original)** The method of claim 31 wherein the second halogen is chlorine and the concentration of the second halogen in the second section is in a range of between about 0.7% and 1.0% by weight.

37. **(original)** The method of claim 36 wherein the first halogen is fluorine and the concentration of the first halogen in the first section is in a range of between about 1.0% and 1.3% by weight.

38. **(new)** The method of claim 31 wherein the first halogen is fluorine and the second halogen is chlorine.

39. **(new)** The method of claim 31 wherein the glass tube comprises fluorine-doped silica.

40. **(new)** The method of claim 31 wherein the first section is predominantly doped with only the first halogen and the second section is predominantly doped with only the second halogen.